

FORM PTO-1449 U.S. Department of Commerce
Patent and Trademark Office

Attorney Docket Number
3477-89

Serial No.
09/674,237

LIST OF DOCUMENTS CITED BY APPLICANT

(Use several sheets if necessary)

RECEIVED

JAN 17 2002

Applicants: Egan et al.

TECH CENTER 1600/2900

Filing Date: July 24, 2001

Group
1646

U. S. PATENT DOCUMENTS

Examiner Initial		Document Number	Date	Name	Class	Subclass	Filing Date if Appropriate
th	1	US 5,717,067 A	02-10-98	Fazioli et al.			

FOREIGN PATENT DOCUMENTS

		Document Number	Date	Country	Class	Subclass	Translation Yes No
th	2	WO 96 31625 A	10-26-96	PCT			

OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)

th	3	H. Riezman, P. G. Woodman, G. van Meer, M. Marsh. Molecular mechanisms of Endocytosis. Cell 91: 731-738, 1997.
	4	S. L. Schmid. Clathrin-coated vesicle formation and protein sorting: an integrated process. Annu. Rev. Biochem. 66: 511-548, 1997.
	5	M. S. Robinson. Coats and budding vesicles. Trends Cell. Biol. 7: 99-102, 1997.
	6	D. E. Warnock, S. L. Schmid. Dynamin GTPase, a force-generating molecular switch. BioEssays 18: 885-893, 1996.
	7	R. Urrutia, J. R. Henley, T. Cook, M. A. McNiven. The dynamins: redundant or distinct functions for an expanding family of related GTPases? Proc. Natl. Acad. Sci. USA 94: 377-384, 1997.
	8	P. Wigge, K. Kohler, Y. Vallis, C. A. Doyle, D. Owen, S. P. Hunt, H. T. McMahon. Amphiphysin Heterodimers: Potential Role in Clathrin-mediated Endocytosis. Molecular Biology of the Cell 8: 2003-2015, 1997.
	9	A. L. Munn, B. J. Stevenson, M. I. Geli, H. Riezman. end5, end6 and end7: mutations that cause actin delocalization and block the internalization step of endocytosis in Saccharomyces cerevisiae. Molecular Biology of the Cell 6: 1721-1742, 1995.
	10	O. Shupliakov, P. Low, D. Grabs, H. Gad, H. Chen, C. David, K. Takei, P. De Camilli, L. Brodin. Synaptic vesicle endocytosis impaired by disruption of dynamin-SH3 domain interactions. Science 276: 259-263, 1997.
	11	P. Wigge, Y. Vallis, H. T. McMahon. Inhibition of receptor-mediated endocytosis by the amphiphysin SH3 domain. Current Biology 7: 554-560, 1997.
	12	H. McLauchlan, J. Newell, N. Morrice, A. Osborne, M. West, E. Smythe. A novel role for Rab5-GDI in ligand sequestration into clathrin-coated pits. Current Biology 8: 34-45, 1997.
	13	P. J. Robinson, J.-M. Sontag, J.-P. Liu, E. M. Fykse, C. Slaughter, H. McMahon, T. C. Sudhof. Dynamin GTPase regulated by protein kinase C phosphorylation in nerve terminals. Nature 365: 163-166, 1993.
	14	J.-P. Liu, A. T. R. Sim, P. J. Robinson. Calcineurin inhibition of Dynamin GTPase activity coupled to nerve terminal depolarization. Science 265: 970-973, 1994.
	15	A. Wilde, F. M. Brodsky. In vivo phosphorylation of Adaptors regulates their interaction with Clathrin. The Journal of Cell Biology 135: 635-645, 1996.

EXAMINER
EXAMINER

M. T. DAVIS

DATE CONSIDERED

12/30/03

Initial if reference considered, whether or not citation is in conformance with MPEP 609; draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

FORM PTO-1449 U.S. Department of Commerce
Patent and Trademark Office

Attorney Docket Number
3477-89

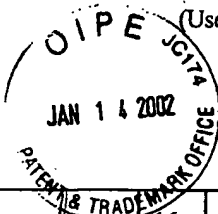
Serial No.

RECEIVED

JAN 17 2002

LIST OF DOCUMENTS CITED BY APPLICANT

(Use several sheets if necessary)



Applicants: Egan et al.

TECH CENTER 1600/2900

Filing Date: July 24, 2001

Group
1646

16	R. Bauerfeind, K. Takei, P. De Camilli. Amphiphysin I is associated with coated endocytic intermediates and undergoes stimulation-dependent dephosphorylation in nerve terminals. <i>J. Biol. Chem.</i> 272: 30984-30992, 1997.
17	S. van Delft, R. Govers, G. J. Strous, A. J. Verkleij, P. M. P. van Bergen en Henegouwen. Epidermal growth factor induces ubiquitination of Eps15. <i>Journal of Biological Chemistry</i> 272: 14013-14016, 1997.
18	J.-M. Galan, R. Haguenauer-Tsapis. Ubiquitin Lys63 is involved in ubiquitination of a membrane plasma membrane protein. <i>EMBO J</i> 16: 5847-5854, 1997.
19	J. Terrel, S. Shih, R. Dunn, L. Hicke. A function for monoubiquitination in the internalization of a G protein-coupled receptor. <i>Molecular Cell</i> 1: 193-202, 1998.
20	R. Govers, P. van Kerkhof, A. L. Schwartz, G. J. Strous. Linkage of the ubiquitin-conjugating system and the endocytic pathway in ligand-induced internalization of the growth hormone receptor. <i>EMBO J</i> 16: 4851-4858, 1997.
21	P. De Camilli, S. D. Emr, P. S. McPherson, P. Novick. Phosphoinositides as regulators in membrane traffic. <i>Science</i> 271: 1533-1539, 1996.
22	E. Kubler, H. Riezman. Actin and fimbrin are required for the internalization step of endocytosis in yeast. <i>EMBO J</i> 12: 2855-2862, 1993.
23	H. Benedetti, S. Raths, F. Crausaz, H. Riezman. The END3 gene encodes a protein that is required for the internalization step of endocytosis and for actin cytoskeleton organization in yeast. <i>Mol. Biol. Cell</i> 5: 1023-1037, 1994.
24	M. I. Geli, H. Riezman. Role of Type I Myosin in receptor-mediated endocytosis in yeast. <i>Science</i> 272: 533-535, 1996.
25	H.-Y. Tang, M. Cai. The EH-domain-containing protein Pan1 is required for normal organization of the actin cytoskeleton in <i>Saccharomyces cerevisiae</i> . <i>Mol. Cell. Biol.</i> 16: 4897-4914, 1996.
26	V. Moreau, J.-M. Galan, G. Devilliers, R. Haguenauer-Tsapis, B. Winsor. The yeast Actin-related protein Arp2p is required for the internalization step of endocytosis. <i>Molecular Biology of the Cell</i> 8: 1361-1375, 1997.
27	B. Wendland, S. D. Emr. Pan1p, Yeast eps15, functions as a multivalent adaptor that coordinates protein-protein interactions essential for endocytosis. <i>Journal of Cell Biology</i> 141: 71-84, 1998.
28	F. Fazioli, L. Minichiello, B. Matoskova, W. T. Wong, P. P. Di Fiore. eps15, A novel tyrosine kinase substrate, exhibits transforming activity. <i>Mol. Cell. Biol.</i> 13: 5814-5828, 1993.
29	A. Benmerah, J. Gagnon, B. Begue, B. Megarbane, A. Dautry-Varsat, N. Cerf-Bensussan. The Tyrosine kinase substrate EPS15 is constitutively associated with the plasma membrane adaptor AP2. <i>J. Cell Biol.</i> 131: 1831-1838, 1995.
30	F. Tebar, T. Sorkina, A. Sorkin, M. Ericsson, T. Kirchhausen. Eps15 Is a component of Clathrin-coated Pits and Vesicles and is located at the Rim of Coated Pits. <i>Journal of Biological Chemistry</i> 271: 28727-28730, 1996.
31	F. Tebar, S. Confalonieri, R. E. Carter, P. P. Di Fiore, A. Sorkin. Eps15 is Constitutively Oligomerized due to Homophilic interaction of its Coiled-coil domain. <i>Journal of Biological Chemistry</i> 272: 15413-15418, 1997.
32	R. Carbone, S. Fre, G. Iannolo, F. Belleudi, M. P., P. G. Pelicci, M. R. Torrisi, P. P. Di Fiore. eps15 and eps15R are essential components of the endocytic pathway. <i>Cancer Research</i> 57: 5498-5504, 1997.
33	A. Benmerah, C. Lamaze, B. Begue, S. L. Schmid, A. Dautry-Varsat, N. Cerf-Bensussan. AP-2/Eps15 interaction is required for receptor-mediated endocytosis. <i>Journal of Cell Biology</i> 140: 1055-1062, 1998.
34	W. T. Wong, C. Schumacher, A. E. Salcini, A. Romano, P. Castagnino, P. G. Pelicci, P. P. Di Fiore. A protein-binding domain, EH, identified in the receptor tyrosine kinase substrate EPS15 and conserved in

EXAMINER
EXAMINER

M. T. Davis

DATE CONSIDERED

12/30/03

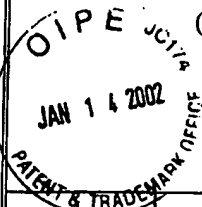
Initial if reference considered, whether or not citation is in conformance with MPEP 609; draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

FORM PTO-1449 U.S. Department of Commerce
Patent and Trademark Office

Attorney Docket Number
3477-89

Serial No.
09/674,237

LIST OF DOCUMENTS CITED BY APPLICANT



(Use several sheets if necessary)

Applicants: Egan et al.

Filing Date: July 24, 2001

Group
1646

RECEIVED

JAN 17 2002

TECH CENTER 1600/290

		evolution. <i>Proc. Natl. Acad. Sci. USA</i> 92: 9530-9534, 1995.
35		P. P. Di Fiore, P. G. Pelicci, A. Sorkin. EH: a novel protein-protein interaction domain potentially involved in intracellular sorting. <i>Trends. Biochem. Sci.</i> 22: 411-413, 1997.
36		C. Schumacher, B. S. Knudsen, T. Ohuchi, P. P. Di Fiore, R. H. Glassman, H. Hanafusa. The SH3 domain of Crk binds specifically to a conserved proline-rich motif in Eps15 and Eps15R. <i>Journal of Biological Chemistry</i> 270: 15341-15347, 1995.
37		A. Benmerah, B. Begue, A. Dautry-Vasat, N. Cerf-Bensussan. The Ear of alpha-Adaptin interacts with the COOH-terminal domain of the EPS15 protein. <i>Journal of Biological Chemistry</i> 271: 12111-12116, 1996.
38		G. Iannolo, A. E. Salcini, I. Gaidarov, O. B. J. Goodman, J. Baulida, G. Carpenter, P. G. Pelicci, P. P. Di Fiore, J. H. Keen. Mapping of the molecular determinants involved in the interaction between Eps15 and AP2. <i>Cancer Research</i> 57: 240-245, 1997.
39		L. Coda, A. E. Salcini, S. Confalonieri, G. Pelicci, T. Sorkina, A. Sorkin, P. G. Pelicci, P. P. Di Fiore. Eps15R is a tyrosine kinase substrate with characteristics of a docking protein possibly involved in coated pits-mediated internalization. <i>Journal of Biological Chemistry</i> 273: 3003-3012, 1998.
40		B. Wendland, J. M. McCaffery, Q. Xiao, S. D. Emr. A Novel Fluorescence-activated Cell Sorter-based screen for yeast Endocytosis mutants identifies a yeast homologue of mammalian eps15. <i>J. Cell Biol.</i> 135: 1485-1500, 1996.
41		S. Rath, J. Rohrer, F. Crausaz, H. Riezman. end3 and end4: Two mutants defective in receptor-mediated and fluid-phase endocytosis in <i>Saccharomyces cerevisiae</i> . <i>The Journal of Cell Biology</i> 120: 55-65, 1993.
42		H. Y. Tang, A. Munn, M. Cai. EH domain proteins Pan1p and End3p are components of a complex that plays a dual role in organization of the cortical actin cytoskeleton and endocytosis in <i>Saccharomyces cerevisiae</i> . <i>Mol. Cell. Biol.</i> 17: 4294-4304, 1997.
43		T. Zoladek, A. Tobiasz, G. Vaduva, M. Boguta, N. C. Martin, A. K. Hopper. MDP1, a <i>Saccharomyces cerevisiae</i> gene involved in mitochondrial/cytoplasmic protein distribution, is identical to the ubiquitin-protein ligase gene RSP5. <i>Genetics</i> 145: 595-603, 1997.
44		P. S. McPherson, E. P. Garcia, V. I. Slepnev, C. David, X. Zhang, D. Grabs, W. S. Sossin, R. Bauerfeind, Y. Nemoto, P. De Camilli. A presynaptic inositol-5-phosphatase. <i>Nature</i> 379: 353-357, 1996.
45		A. E. Salcini, S. Confalonieri, M. Doria, E. Santolini, E. Tassi, O. Minencova, G. Cesareni, P. G. Pelicci, P. P. Di Fiore. Binding specificity and in vivo targets of the EH domain, a novel protein-protein interaction module. <i>Genes & Development</i> 11: 2239-2249, 1997.
46		I. Gout, R. Dhand, I. D. Hiles, M. J. Fry, G. Panayotou, P. Das, O. Truong, N. F. Totty, J. Hsuan, G. W. Booker, I. D. Campbell, M. D. Waterfield. The GTPase dynamin binds to and is activated by a subset of SH3 domains. <i>Cell</i> 75: 25-36, 1993.
47		C. David, P. S. McPherson, O. Mundigl, P. De Camilli. A role of amphiphysin in synaptic vesicle endocytosis suggested by its binding to dynamin in nerve terminals. <i>Proc. Natl. Acad. Sci. USA</i> 93: 331-335, 1996.
48		M. H. Butler, C. David, G.-C. Ochoa, Z. Freyberg, L. Daniell, D. Grabs, O. Cremona, P. De Camilli. Amphiphysin II (SH3P9/BIN1), a member of the Amphiphysin/Rvs family, is concentrated in the cortical cytomatrix of axon initial segments and Nodes of Ranvier in brain and around T Tubules in skeletal muscle. <i>Journal of Cell Biology</i> 137: 1355-1367, 1997.
49		C. Leprince, F. Romero, D. Cussac, B. Vayssiere, R. Berger, A. Tavitian, J. H. Camonis. A new member of the Amphiphysin family connecting endocytosis and signal transduction pathways. <i>J. Biol. Chem.</i> 272: 15101-15105, 1997.
50		A. R. Ramjaun, K. D. Micheva, I. Bouchelet, P. S. McPherson. Identification and characterization of a nerve terminal-enriched amphiphysin isoform. <i>J. Biol. Chem.</i> 272: 16700-16706, 1997.

EXAMINER
EXAMINER

M. T. Davis

DATE CONSIDERED

12/30/03

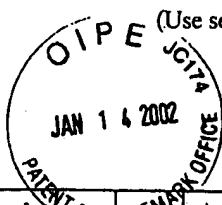
Initial if reference considered, whether or not citation is in conformance with MPEP 609; draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

FORM PTO-1449 U.S. Department of Commerce
Patent and Trademark Office

Attorney Docket Number
3477-89

Serial No.
09/674,237

LIST OF DOCUMENTS CITED BY APPLICANT



(Use several sheets if necessary)

Applicants: Egan et al.

Filing Date: July 24, 2001

Group
1646

1	52	A. Wesp, L. Hicke, J. Palecek, R. Lombardi, T. Aust, A. L. Munn, H. Riezman. End4p/Slp2p Interacts with Actin-associated proteins for endocytosis in <i>Saccharomyces cerevisiae</i> . <i>Molecular Biology of the Cell</i> 8: 2291-2306, 1997.
2	53	E. de Heuvel, A. W. Bell, A. R. Ramjaun, K. Wong, W. S. Sossin, P. S. McPherson. Identification of the major Synaptojanin-binding proteins in the brain. <i>J. Biol. Chem.</i> 272: 8710-8716, 1997.
3	54	N. Ringstad, Y. Nemoto, P. De Camilli. The SH3p4/SH3p8/SH3p13 protein family: binding partners for synaptojanin and dynamin via a Grb2-like Src homology 3 domain. <i>Proc. Natl. Acad. Sci. USA</i> 94: 8569-8574, 1997.
4	55	Z. Wang, M. F. Moran. Requirement for the Adapter protein Grb2 in EGF receptor endocytosis. <i>Science</i> 272: 1935-1939, 1996.
5	56	A. B. Sparks, N. G. Hoffman, S. J. McConnel, D. M. Fowlkes, B. K. Kay. Cloning of ligand targets: Systematic isolation of SH3 domain-containing proteins. <i>Nature Biotechnology</i> 14: 741-744, 1996.
6	57	P. Cupers, E. ter Haar, W. Boll, T. Kirchhausen. Parallel dimers and anti-parallel tetramers formed by Epidermal Growth Factor Receptor Pathway Substrate Clone 15 (Eps15). <i>Journal of Biological Chemistry</i> 272: 33430-33434, 1997.
7	58	H. Stenmark, C. Bucci, M. Zerial. Expression of Rab GTPases using recombinant vaccinia virus. <i>Meth. Enzymol.</i> 257: 155-164, 1995.
8	59	S. van Delft, C. Schumacher, W. Hage, A. J. Verkleij, P. M. P. van Bergen en Henegouwen. Association and Colocalization of Eps15 with Adaptor Protein-2 and Clathrin. <i>The Journal of Cell Biology</i> 136: 811-821, 1997.
9	60	M. Toth, J. Grimsby, G. Buzsaki, G. P. Donovan. Epileptic seizures caused by inactivation of a novel gene, jerky, related to centromere binding protein-B in transgenic mice. <i>Nature Genetics</i> 11: 71-75, 1995.
10	61	Roos, J. and Kelly, R. B. Dap160, a Neural-specific Eps15 homology and multiple SH3 domain-containing protein that interacts with <i>Drosophila</i> Dynamin. <i>J. Biol. Chem.</i> 273, 19108-19119, 1998.
11	62	Ren, R., Mayer, B.J. Cicchetti, P. and Baltimore, D. Identification of a Ten-Amino Acid Proline-Rich SH3 Binding Site. <i>Science</i> , 259, 1157-1161, 1993.
12	63	Hall, A. Rho GTPases and the actin cytoskeleton. <i>Science</i> , 279, 509-514, 1998.
13	64	Nalefski, E.A. and Falke, J.J. The C2 domain calcium-binding motif: Structural and functional diversity. <i>Protein Science</i> . 5, 2375-2390, 1996.
14	65	Chen, H., et al., Epsin is an EH-domain binding protein implicated in clathrin-mediated endocytosis. <i>Nature</i> , 394, 793-797.
15	66	Stukenberg, P.T. et al., Systematic identification of mitotic phosphoproteins. <i>Current Biology</i> , 7, 338-348, 1997.
16	67	Tang, H. Y. and Cai, M. The EH-domain containing protein Pan1 is required for normal organization of the actin cytoskeleton in <i>Saccharomyces cerevisiae</i> . <i>Mol. Cell. Biol.</i> 16, 4897-4914, 1996.
17	68	DATABASE EMVRT E.M.B.L. Databases, Accession Number: AF032118, 27 November 1997.
18	69	Yamabhai, M. et al. (1998) "Intersectin, a novel adaptor protein with two Eps15 homology and five Src homology 3 domains" <i>JOURNAL OF BIOLOGICAL CHEMISTRY</i> , v. 273, no. 47, pp. 31401-31407.
19	70	DATABASE EMEST24, E.M.B.L. Databases, Accession Number: AA061808, 24 September 1996, Marra, M. et al.
20	71	DATABASE EMEST23, E.M.B.L. Databases, Accession Number: AA217338, 11 February 1997, Marra M. et al.
21		Sengar, A. et al., (1999), "The EH and SH3 domain Eps proteins regulate endocytosis by linking to dynamin and Eps15" <i>EMBO JOURNAL</i> , v. 18, no. 5, pp. 1159-1171.

EXAMINER
EXAMINER

DATE CONSIDERED

Initial if reference considered, whether or not citation is in conformance with MPEP 609; draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

